Caveat: Just because it's documented doesn't mean it works that way.

About Handebug

Handebug is a debugging tool specifically written for the Handy project. It was designed to allow downloading programs and data files, examining and changing memory and registers, breakpointing and stepping through code, and uploading and saving memory. It will also communicate with Handecraft, providing a limited emulation of the Suzy display hardware.

Handebug tries to provide a continuous display of important data. The display screen includes the current register contents, a list of current breakpoints and their status, selected memory locations and their contents, and a data display window that can be switched among CODE, DATA, SYMBOLS, and TRACE RAM. When Handebug is initially loaded all memory and register displays are zero. As soon as communications is established the register display is updated and, if the display window is set to CODE or DATA, will update the currently displayed page of memory.

When the program under development is running Handebug is not able to communicate with Handy. The display is normally not updated in this case. However, it will respond to special "slave mode" requests made by the software under development, allowing updating of specific displays at program controlled intervals. These "slave mode" requests are also the mechanism used to implement the Suzy emulation.

Handebug is also designed perform selected updates of the display at regular timed intervals by temporarily interrupting the running program to request the specified data. Currently this is not enabled because of potential problems with slave mode requests.

Getting Started

Handebug can only be run from the CLI. It is still under development, and occasionally debugging information may be printed in the CLI console window. To load Handebug, type "Handebug" or "Run Handebug" at the CLI prompt. Either method will work, although the second one is recommended since it will run the debugger as a background CLI task, leaving the CLI free to do other things. If you don't "Run" it, the CLI will be tied up executing Handebug, forcing you to open yet another CLI window to do other things, like editing or assembling files, and windows require screen (CHIP) memory which is at a premium when performing Suzy emulation. In general, the fewer windows open the better.

Handebug takes over the parallel port and opens a custom screen on the Amiga display. The screen can be pushed to the back or slid up or down using the drag bar (title bar) and positioning gadgets at the top of the display. This allows easy access to the WorkBench screen and the CLI windows, and to Handycraft's screen. At the upper left corner of the Handebug screen is a close box. To exit bug simply select this gadget with the pointer by pointing and clicking on with the left mouse button.

Once the display is up, Handebug attempts to communicate with Handy. If Handy isn't talking yet there may be a delay of up to 3 seconds while the communications times out. At this point the debugger is functional.